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EXAMINER	
RYMAN, DANIEL J	
ART UNIT	**PAPER NUMBER**
2665	13

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Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/209,900	TANI ET AL.	
	Examiner	Art Unit	
	Daniel J. Ryman	2665	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *20 October 2003* .

2a)☒ This action is **FINAL**. 2b)☐ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1,2,5,6,10,19-42 and 51-54* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☐ Claim(s) _____ is/are allowed.

6)☒ Claim(s) *1,2,5,6,10,19-42 and 51-54* is/are rejected.

7)☐ Claim(s) _____ is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

11)☐ The proposed drawing correction filed on _____ is: a)☐ approved b)☐ disapproved by the Examiner.

If approved, corrected drawings are required in reply to this Office action.

12)☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

13)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____ .

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

14)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).

a) ☐ The translation of the foreign language provisional application has been received.

15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ .
4) ☐ Interview Summary (PTO-413) Paper No(s). _____ .
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: .

DETAILED ACTION

Response to Amendment

1. Applicant's arguments with respect to claims 1, 2, 5, and 19-42 have been considered but are moot in view of the new ground(s) of rejection.

2. Applicant's arguments filed 10/20/2003 have been fully considered but they are not persuasive with respect to claims 6 and 10. On pages 12-13 of the response, Applicant argues with regards to claim 1, and by extension claim 6, that the cited references do not disclose "a filter executing a predetermined processing 'to control an amount of transmission data per unit of time for outputting the stream data to the terminal device'". Examiner, respectfully, disagrees. First, Humpleman discloses that the switch removes jitter from the incoming data streams (col. 5, lines 27-29 and col. 6, lines 46-51). It is very well known in the art to use jitter buffers to remove jitter where jitter buffers retime the incoming information in order to have the output of the jitter buffer match the rate of the terminal device. Thus, Humpleman strongly suggests "a filter executing a predetermined processing 'to control an amount of transmission data per unit of time for outputting the stream data to the terminal device'" where a jitter buffer is broadly defined to be a filter. Second, Ito teaches retiming incoming streams in order to compensate for network load (Fig. 3; col. 3, lines 31-57; and col. 5, line 51-col. 6, line 18). As such, Examiner maintains that the cited prior art reads on the presently presented claims.

3. In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., that the reduced data are transmitted to the terminal device, when traffic is large, while unreduced data are transmitted to the file device) are not recited in the rejected claim(s). Although the claims are

interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993). Applicant has attempted to include these limitations in the rejected claims; however, the limitations are still too broad, such that the limitations still read on the prior art when a broad interpretation of the limitation is taken. As such, Examiner maintains that the prior art reads on the presently presented claims.

4. Applicant further argues that the subject matter of the prior art and the claimed invention differ. Examiner, respectfully, submits that, even if the subject matter of the prior art and the claimed invention differ, the prior art still reads on the claims, as currently worded. Examiner maintains that the rejections of claims 6 and 10 are proper since limitations have not been added to the claims which clearly distinguish the claims over the prior art.

5. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Claim Objections

6. Claim 25 is objected to because of the following informalities: "a file I/O controller ... and outputs" should be "a file I/O controller ... and outputting" and "a transmitter transmitting ... to either the terminal device or to the file device ... and transmitting ... to the file device" should be "a transmitter transmitting ... to the terminal device ... and transmitting ... to the file device" since the claim states, two times, that the information is transmitted to the file device. Appropriate correction is required.

Claim Rejections - 35 USC § 103

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

8. Claims 1, 2, 25, 26, 36, and 38-40 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ketcham (USPN 6,212,206).

9. Regarding claims 1 and 25, Humpleman discloses a system for distributing stream data after executing a predetermined processing of the stream data from an external network, comprising: a receptor receiving the stream data transmitted through at least one of a broadcasting network and a communication network (ref. 30) (col. 1, line 66-col. 2, line 26 and col. 4, lines 36-45); a selector selecting a predetermined unit of information corresponding to sub-stream data forming part of the stream data received by the receptor according to a request from a user (col. 1, lines 40-54 and col. 3, lines 18-40) where it is implicit that a selector is used to select data from a broadcast network; a file I/O controller controlling a file device and

outputting the predetermined unit of information corresponding to the sub-stream data selected by the selector to the file device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14, esp. col. 3, lines 59-63); a terminal device having information reproduction function (col. 3, lines 5-17 and col. 3, line 53-col. 4, line 14); and a transmitter transmitting the predetermined unit of information corresponding to the sub-stream data selected by the selector to the terminal device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14) and transmitting the predetermined unit of information corresponding to the sub-stream data selected by the selector to the file device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14). Humpleman does not expressly disclose a filter executing the predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to at least one of the file device and a terminal device having an information reproduction function or a transmitter that transmits while the filter is executing the predetermined processing, according to a limitation set by an amount of transmission data per unit of time based on a distribution condition of a local area network. Humpleman does disclose that the interface removes jitter from the packet streams (col. 5, lines 27-29 and col. 6, lines 46-51). Ketcham teaches, in a local area network, using a jitter buffer in order to remove jitter from the packet stream where the jitter buffer, as broadly defined, is a filter that executes predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to a network station (col. 2, lines 18-23 and col. 3, lines 22-63). Ketcham also teaches a transmitter that transmits while the filter is executing the predetermined processing, according to a limitation set by an amount of transmission data per unit of time based on a distribution condition (playout rate) (col. 2, lines 18-23 and col. 3, lines 22-63). Thus it would have been obvious to one of ordinary skill in the art at the time of the

invention to have a filter executing the predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to at least one of the file device and a terminal device having an information reproduction function or a transmitter that transmits while the filter is executing the predetermined processing, according to a limitation set by an amount of transmission data per unit of time based on a distribution condition of a local area network in order to remove the jitter from the incoming data stream.

10. Regarding claim 2, referring to claim 1, Humpleman in view of Ketcham implicitly discloses that the stream data is constructed with information in a packet unit, and a packet identifier for identifying data in a packet is added to each packet, and the selector extracts the predetermined unit of information which is requested from the user by referring to the packet identifier (Humpleman: col. 2, lines 5-9; col. 3, line 59-col. 4, line 13; col. 10, lines 24-29; and col. 11, lines 11-30).

11. Regarding claim 26 and 40, referring to claim 25, Humpleman in view of Ketcham discloses that the predetermined unit of information and the sub-stream data includes at least one of video, audio, static image, and character information (Humpleman: col. 3, line 5-col. 4, line 35).

12. Regarding claim 36, referring to claim 25, Humpleman in view of Ketcham discloses, as broadly defined, that when the amount of transmission data is reduced by the filter (playout is reduced), the original stream data before reduction (the original data stream) are stored in the file device (buffer) while the reduced stream data are sent to the terminal device (Ketcham: col. 3, lines 42-59) where the I/O device performs data translations from the external to the internal network such that the I/O device could comprise a jitter buffer and where, as broadly defined, the

original data stream and the reduced data stream could be the same data stream such that the original data stream is input to a buffer and the reduced (rate) data stream is read from the buffer.

13. Regarding claim 38, referring to claim 25, Humpleman in view of Ketcham discloses that the predetermined unit of information is transmitted to the terminal device through one or more transmitters selected by the selector (Humpleman: col. 6, lines 9-27; col. 10, lines 24-29; and col. 11, lines 11-30).

14. Regarding claim 39, referring to claim 25, Humpleman in view of Ketcham discloses that the local area network is installed in an ordinary home (Humpleman: col. 2, lines 10-26 and col. 3, lines 5-45).

15. Claims 5 and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ketcham (USPN 6,212,206) as applied to claims 1 and 25 above, and further in view of Budow et al (USPN 5,625,864).

16. Regarding claims 5 and 27, referring to claims 1 and 25, Humpleman in view of Ketcham does not expressly disclose that the selector outputs the stream data received from the receptor to the file I/O controller when either a recording request is received from the user or a predetermined recording condition is met, and the file device stores the stream data received from the selector or that the file I/O controller is capable of outputting stored information in the file device to the selector when either a request for the outputting is received from the user or the distribution condition of a local area network permits the outputting. Budow teaches, in a information distribution system, outputting stream data received from a receptor to a file I/O controller when either a recording request is received from the user or a predetermined recording

condition is met, and the file device stores the stream data received from the selector in order to allow a user to record programs (col. 3, lines 4-16; col. 4, lines 30-67; col. 5, lines 36-51; and col. 6, lines 25-41) where it is implicit that the controller stores information based on a predetermined recording condition. Budow also teaches that the file I/O controller is capable of outputting stored information in the file device to the selector when either a request for the outputting is received from the user or the distribution condition of a local area network permits the outputting in order to play back a recorded program (col. 3, lines 4-16; col. 4, lines 30-67; col. 5, lines 36-51; and col. 6, lines 25-41). It would have been obvious to one of ordinary skill in the art at the time of the invention to have the selector output the stream data received from the receptor to the file I/O controller when either a recording request is received from the user or a predetermined recording condition is met, and to have the file device store the stream data received from the selector in order to allow a user to record programs. It also would have been obvious to one of ordinary skill in the art at the time of the invention that the file I/O controller is capable of outputting stored information in the file device to the selector when either a request for the outputting is received from the user or the distribution condition of a local area network permits the outputting in order to play back a recorded program.

17. Claims 6 and 10 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Budow et al (USPN 5,625,864) in further view of Ito et al (USPN 6,014,693).

18. Regarding claim 6, Humpleman a stream distribution system comprising: a stream distribution server (col. 3, lines 5-52; col. 4, lines 55-63; and col. 5, lines 24-41), where, as broadly defined, the "switching hub" is a "stream distribution server", a plurality of terminal

devices each having an information reproduction function (col. 3, lines 5-17 and col. 3, line 53-col. 4, line 14), and a local area network connecting both of the stream distribution server and the plurality of terminal devices (col. 3, lines 5-52 and col. 5, lines 24-41), wherein the stream distribution server targets the stream data comprising information in a packet unit, wherein an identifier to identify the type of data in the packet is added to each packet (col. 3, lines 5-52; col. 4, lines 55-63; col. 5, lines 24-41; and col. 10, lines) where it is implicit that an identifier to identify the type of data in the packet is added to each packet in the form of a header, the stream distribution system further comprising: a plurality of reception means for receiving the stream data transmitted through a broadcasting network or a communication network (ref. 30) (col. 1, line 66-col. 2, line 26 and col. 4, lines 36-45); selection means capable of connecting the plurality of reception means, for mixing or remultiplexing a plurality of the stream data input from the reception means, and for selecting and extracting a predetermined unit of information which coincides with a request for sending and recording received from the terminal device by referring to the identifier to identify the predetermined unit of information which forms the stream data (col. 1, lines 40-54 and col. 3, lines 18-40) where it is implicit that a selector is used to select a particular data stream from a broadcast network; transmission means for transmitting the selected and extracted information to the terminal device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14) ; and file I/O means for controlling a file device under management of the stream distribution server and for outputting information selected by the selection means to the file device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14, esp. col. 3, lines 59-63), wherein the selection means branches and distributes the selected and extracted information to the transmission means or to the file I/O means corresponding to the terminal device (col. 1, lines

40-54 and col. 3, lines 18-40). Although Humpleman discloses file I/O means for controlling a file device under management of the stream distribution server and for outputting information selected by the selection means to the file device, the details of the file I/O means are not disclosed. As additional evidence of file I/O means, Budow discloses, in an information distribution system, having file I/O means for controlling a file device under management of the stream distribution server and for outputting information selected by the selection means to the file device, wherein the selection means branches and distributes the selected and extracted information to the transmission means or to the file I/O means corresponding to the terminal device in order to allow programs to be recorded and watched at a later time (col. 3, lines 4-16; col. 4, lines 30-43; col. 4, lines 64-67; col. 5, lines 36-51; col. 8, line 59-col. 9, line 41; col. 12, lines 29-64; and col. 15, lines 54-62). It would have been obvious to one of ordinary skill in the art at the time of the invention to have file I/O means for controlling a file device under management of the stream distribution server and for outputting information selected by the selection means to the file device, wherein the selection means branches and distributes the selected and extracted information to the transmission means or to the file I/O means corresponding to the terminal device in order to allow programs to be recorded. Humpleman in view of Budow does not expressly disclose filter means for controlling an amount of transmission data per unit of time to be output to the terminal device or transmission means that uses the filter means to adjust the transmission band of the stream data received from the selection means based on a limitation on a predetermined data transmission band. Humpleman in view of Budow does disclose that the switch removes jitter from the incoming data streams (Humpleman: col. 5, lines 27-29 and col. 6, lines 46-51), where Examiner takes official notice

that jitter buffers are well known in the art as a means for removing jitter by adjusting the transmission band of the stream data received from the selection means based on a limitation on a predetermined data transmission band. In addition, Ito discloses, in an information distribution system, having a server which receives video data and which contains a filter means for controlling an amount of transmission data per unit of time to be output to the terminal device in order to compensate for high network load (col. 2, line 60-col. 3, line 20) where filter means is broadly interpreted to mean the video index which filters the data stream according to rate instructions. Ito also discloses transmission means that uses the filter means to adjust the transmission band of the stream data received from the selection means based on a limitation on a predetermined data transmission band in order to compensate for high network load (col. 2, line 46-col. 4, line 40). It would have been obvious to one of ordinary skill in the art at the time of the invention to have filter means for controlling an amount of transmission data per unit of time to be output to the terminal device and to have transmission means that uses the filter means to adjust the transmission band of the stream data received from the selection means based on a limitation on a predetermined data transmission band in order to compensate for high network load.

19. Regarding claim 10, referring to claim 6, Humpleman in view of Budow in further view of Ito discloses that the file I/O means and the transmission means are controlled according to a storage data reading request from the terminal device, and the stream data stored in the file device are transmitted to the terminal device through the file 1/O means, the selection means and the transmission means (Humpleman: col. 2, lines 10-26 and col. 3, lines 5-45 and Budow: col.

3, lines 4-16; col. 4, lines 30-43; col. 4, lines 64-67; col. 5, lines 36-51; col. 8, line 59-col. 9, line 41; col. 12, lines 29-64; and col. 15, lines 54-62).

20. Claims 19-24, 28-32, 37, 41, and 42 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ketcham (USPN 6,212,206) as applied to claim 1 above, and further in view of Ito et al (USPN 6,014,693).

21. Regarding claims 19 and 37, referring to claims 1 and 25, Humpleman in view of Ketcham does not expressly disclose that the distribution condition is changed dynamically according to a use state of the local area network. Humpleman in view of Ketcham does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Humpleman in view of Ketcham also discloses adjusting the distribution condition according to the state of the external network (Ketcham: col. 3, lines 42-59) where playout from the buffers is adjusted according to packet arrival times. Ito teaches, in an information distribution system, having the distribution condition is changed dynamically according to a use state of the network in order to compensate for high network load (col. 3, lines 31-57). It would have been obvious to one of ordinary skill in the art at the time of the invention to have the distribution condition change dynamically according to a use state of the local area network in order to compensate for high network load.

22. Regarding claim 20, referring to claim 19, Humpleman in view of Ketcham in further view of Ito discloses that the predetermined unit of information is transmitted to the terminal device through one or more transmitters selected by the selector (Humpleman: col. 6, lines 9-27; col. 10, lines 24-29; and col. 11, lines 11-30).

23. Regarding claim 21, referring to claim 19, Humpleman in view of Ketcham in further view of Ito discloses that the local area network is installed in an ordinary home (Humpleman: col. 2, lines 10-26 and col. 3, lines 5-45).

24. Regarding claim 22, referring to claim 19, Humpleman in view of Ketcham in further view of Ito discloses that the predetermined unit of information and the sub-stream data includes at least one of video, audio, static image, and character information (Humpleman: col. 3, line 5-col. 4, line 35).

25. Regarding claim 23, referring to claim 19, Humpleman in view of Ketcham in further view of Ito discloses that when the use state of the local area network is such that there is not enough room in the amount of transmission data and the request from the user is for the stream data at a High Definition Level, the transmitter transmits reduced stream data (Ito: Fig. 3 and col. 5, line 51-col. 6, line 18) where the stream data at a High Definition Level is broadly defined as the original data stream.

26. Regarding claims 24 and 42, referring to claims 23 and 41, Humpleman in view of Ketcham in further view of Ito discloses that the reduced stream data comprises the stream data at a Standard Definition Level (Ito: Fig. 3 and col. 5, line 51-col. 6, line 18) where the stream data at a Standard Definition Level is broadly defined as the data stream at the first it rate setting.

27. Regarding claim 28, referring to claim 25, Humpleman in view of Ketcham does not expressly disclose that the filter executes the predetermined processing to control an amount of transmission data per unit of time by using a priority table describing the correspondence between identification information identifying the predetermined unit and a packet priority for each packet unit in the sub-stream data so as to conform with a limitation on a transmission band

based on the packet priority. Humpleman in view of Ketcham does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Humpleman in view of Ketcham also discloses adjusting the distribution condition according to the state of the external network (Ketcham: col. 3, lines 42-59) where playout from the buffers is adjusted according to packet arrival times. Ito teaches, in an information distribution system, using a filter that executes predetermined processing to control an amount of transmission data per unit of time by using a priority table describing the correspondence between identification information identifying the predetermined unit and a packet priority for each packet unit in the sub-stream data so as to conform with a limitation on a transmission band based on the packet priority in order to allow priority data ("other available data") to have higher transmission rates at the expense of lower priority data (compressed "video data") (Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18). It would have been obvious to one of ordinary skill in the art at the time of the invention to have the filter execute the predetermined processing to control an amount of transmission data per unit of time by using a priority table describing the correspondence between identification information identifying the predetermined unit and a packet priority for each packet unit in the sub-stream data so as to conform with a limitation on a transmission band based on the packet priority in order to allow priority data to have higher transmission rates at the expense of lower priority data.

28. Regarding claim 29, referring to claim 28, Humpleman in view of Ketcham in further view of Ito discloses a setting part which sets a limitation on a transmission band allocated to the terminal device according to a use state of the local area network between the transmitter and the terminal device and for setting the priority table included in the filter, wherein the transmitter

receives the stream data from the selector, and transmits the stream data to the terminal device after using the filter to adjust an amount of transmission data to conform with limitation on the transmission band set by the setting part (Ito: Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18).

29. Regarding claim 30, referring to claim 29, Humpleman in view of Ketcham in further view of Ito suggests that the setting part controls the selector, the file I/O controller, and the transmitter according to a storage data reading request from the terminal device, and transmits the stream data stored in the file device to the terminal device through the file I/O controller, the selector, and the transmitter (Humpleman: col. 2, lines 10-26; col. 3, lines 5-45; and col. 7, lines 31-50 and Ito: Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18).

30. Regarding claim 31, referring to claim 29, Humpleman in view of Ketcham in further view of Ito suggests that the receptor is capable of receiving program information relating to the stream data through at least one of the broadcasting network and the communication network (Humpleman: col. 2, lines 10-26 and col. 3, lines 5-45) further comprising: a content information management part which manages the program information multiplexed in the stream data and manages information relating to the stream data stored in the file device as content information; wherein the setting part accepts a request for sending the content information; and the requested content information is sent to the terminal device (Humpleman: col. 2, lines 10-26; col. 3, lines 5-45; and col. 7, lines 31-50 and Ito: Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18).

31. Regarding claim 32, referring to claim 25, Humpleman in view of Ketcham does not expressly disclose a setting part which sets a limitation on the transmission band allocated to at

least one of the terminal device and the file device according to a use state of the local area network, wherein the setting part accepts a sending request or a storing request from a user; and the selector outputs the stream data received from the receptor or the file I/O controller to the transmitter upon receipt of the sending request, or to the file I/O controller upon receipt of the storing request. Humpleman in view of Ketcham does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Humpleman in view of Ketcham also discloses adjusting the distribution condition according to the state of the external network (Ketcham: col. 3, lines 42-59) where playout from the buffers is adjusted according to packet arrival times. Ito teaches, in an information distribution system, having a setting part which sets a limitation on the transmission band allocated to at least one of the terminal device and a file device according to a use state of the local area network, wherein the setting part accepts a sending request or a storing request from a user; and the selector outputs the stream data received from the receptor or the file I/O controller to the transmitter upon receipt of the sending request, or to the file I/O controller upon receipt of the storing request in order to compensate for high network load (Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18). It would have been obvious to one of ordinary skill in the art at the time of the invention to have a setting part which sets a limitation on the transmission band allocated to at least one of the terminal device and the file device according to a use state of the local area network, wherein the setting part accepts a sending request or a storing request from a user; and the selector outputs the stream data received from the receptor or the file I/O controller to the transmitter upon receipt of the sending request, or to the file I/O controller upon receipt of the storing request in order to compensate for high network load.

32. Regarding claim 41, referring to claim 25, Humpleman in view of Ketcham does not expressly disclose that when the use state of the local area network is such that there is not enough room in the amount of transmission data and the request from the user is for the stream data at a High Definition Level, the transmitter transmits reduced stream data. Humpleman in view of Ketcham does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Humpleman in view of Ketcham also discloses adjusting the distribution condition according to the state of the external network (Ketcham: col. 3, lines 42-59) where playout from the buffers is adjusted according to packet arrival times. Ito teaches, in an information distribution system, that when the use state of the local area network is such that there is not enough room in the amount of transmission data and the request from the user is for the stream data at a High Definition Level, the transmitter transmits reduced stream data in order to compensate for high network load (Ito: Fig. 3 and col. 5, line 51-col. 6, line 18) where the stream data at a High Definition Level is broadly defined as the original data stream. It would have been obvious to one of ordinary skill in the art at the time of the invention that when the use state of the local area network is such that there is not enough room in the amount of transmission data and the request from the user is for the stream data at a High Definition Level, the transmitter transmits reduced stream data in order to compensate for high network load.

33. Claims 33-35 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ketcham (USPN 6,212,206) as applied to claim 25 above, and further in view of Budow et al (USPN 5,625,864) in further view of Blahut et al (USPN 5,442,389).

34. Regarding claim 33, referring to claim 25, Humpleman in view of Ketcham does not expressly disclose a setting part which determines whether transmission of the stream data to at least one of the terminal device and the file device is valid or invalid based on a flag information, wherein the setting part accepts a pause request or a resume request from the user; and the selector pauses transmission of the stream data to the terminal device by turning off the flag information according to the pause request, and restarts transmission of the stream data by turning on the flag information according to the resume request. Budow teaches, in a information distribution system, having a setting part that accepts a pause request or a resume request from the user and having the selector pauses transmission of the stream data to the terminal device according to the pause request and restarts transmission of the stream data according to the resume request in order to allow a user to pause a program (col. 3, lines 4-16; col. 4, lines 30-67; col. 5, lines 36-51; and col. 6, lines 25-41). It would have been obvious to one of ordinary skill in the art at the time of the invention to have a setting part that accepts a pause request or a resume request from the user and to have the selector pauses transmission of the stream data to the terminal device according to the pause request and restarts transmission of the stream data according to the resume request in order to allow a user to pause a program. Humpleman in view of Ketcham in further view of Budow does not disclose a setting part which determines whether transmission of the stream data to at least one of the terminal device and the file device is valid or invalid based on a flag information, wherein the selector pauses transmission of the stream data to the terminal device by turning off the flag information according to the pause request, and restarts transmission of the stream data by turning on the flag information according to the resume request. Blahut discloses, in a system for transmitting video information, having a flag in

a packet indicate whether or not the transmission is paused (col. 8, lines 55-56). As broadly defined, a packet that is being continuously transmitted is "valid" while a paused or stopped packet is "invalid." Thus it would have been obvious to one of ordinary skill in the art at the time of the invention to have the setting part determine whether transmission of the stream data to at least one of the terminal device and the file device is valid or invalid based on a flag information wherein the selector pauses transmission of the stream data to the terminal device by turning off the flag information according to the pause request, and restarts transmission of the stream data by turning on the flag information according to the resume request in order to allow a user to pause the transmission and restart the transmission.

35. Regarding claim 34, referring to claim 33, Humpleman in view of Ketcham in further view of Budow in further view of Blahut discloses that the setting part is capable of controlling the selector; the selector is capable of interrupting transmission of the stream data to the terminal device according to the pause request and the selector is capable of outputting the stream data to the file device through the file I/O controller according to the pause request, wherein the selector, according to the resume request, outputs the stream data which have been stored and/or have not been transmitted to the terminal device by a first-in-first-out processing in parallel with storing the stream data in the file device through the file I/O controller (Humpleman: col. 2, lines 10-26; col. 3, lines 5-45; and col. 7, lines 31-50; Budow: col. 3, lines 4-16; col. 4, lines 30-43; col. 4, lines 64-67; col. 5, lines 36-51; col. 8, line 59-col. 9, line 41; col. 12, lines 29-64; and col. 15, lines 54-62; Ito: Fig. 3; col. 2, line 46-col. 4, line 40; and col. 5, line 51-col. 6, line 18; and Blahut: col. 8, lines 55-56).

36. Regarding claim 35, referring to claim 33, Humpleman in view of Ketcham in further view of Budow does not expressly discloses that when a recording request is accepted by the setting part, the setting part inquires whether requested stream data is under recording or not in the file device; if the requested stream data is not under recording, the selector outputs the requested stream data to the file I/O controller for storing, and if the stream requested data is under recording already, the selector does not output the requested stream data for preventing an overlap recording. However, Examiner takes official notice that such steps are known in the art in order to prevent overlap recording. It would have been obvious to one of ordinary skill in the art at the time of the invention to determine if processing a recording request will result in simultaneous recording with another stream in order to prevent overlap recording.

37. Claims 51 and 52 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ito et al (USPN 6,014,693).

38. Regarding claims 51 and 52, Humpleman discloses a system for distributing stream data after executing a predetermined processing of the stream data from an external network, comprising: a receptor receiving the stream data transmitted through a broadcasting network (ref. 30) (col. 1, line 66-col. 2, line 26 and col. 4, lines 36-45); a selector selecting a packet from the stream data received by the receptor according to a request from a user (col. 1, lines 40-54 and col. 3, lines 18-40) where it is implicit that a selector is used to select a particular data stream from a broadcast network; a file I/O controller controlling a file device and outputting the packet selected by the selector to the file device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14, esp. col. 3, lines 59-63); and a transmitter transmitting the packet selected by the selector either to a terminal device having information reproduction function or to the file device while

executing a predetermined processing (col. 3, lines 5-40 and col. 3, line 53-col. 4, line 14). Humpleman does not disclose that the transmitter transmits the packet according to a limitation set by an amount of transmission data per unit of time based on a distribution condition in a local area network which is changed dynamically. Humpleman does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Ito teaches, in an information distribution system, that the transmitter transmits the packet according to a limitation set by an amount of transmission data per unit of time based on a distribution condition in a local area network which is changed dynamically in order to compensate for high network load (col. 3, lines 31-57). It would have been obvious to one of ordinary skill in the art at the time of the invention to have the transmitter transmit the packet according to a limitation set by an amount of transmission data per unit of time based on a distribution condition in a local area network which is changed dynamically in order to compensate for high network load.

39. Claims 53 and 54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Humpleman (USPN 5,940,387) in view of Ketcham (USPN 6,212,206) Ito et al (USPN 6,014,693).

40. Regarding claims 53 and 54, Humpleman discloses a system for distributing stream data after executing a predetermined processing of the stream data from an external network, comprising: a receptor receiving the stream data transmitted through at least one of a broadcasting network and a communication network (ref. 30) (col. 1, line 66-col. 2, line 26 and col. 4, lines 36-45); a selector selecting a packet corresponding to sub-stream data forming part of the stream data received by the receptor according to a request from a user (col. 1, lines 40-54 and col. 3, lines 18-40) where it is implicit that a selector is used to select a particular data stream

from a broadcast network; a file I/O controller controlling a file device and outputting the packet corresponding to the sub-stream data selected by the selector to the file device (col. 3, lines 18-40 and col. 3, line 53-col. 4, line 14, esp. col. 3, lines 59-63); and a transmitter transmitting the packet selected by the selector either to a terminal device having information reproduction function or to the file device while executing a predetermined processing (col. 3, lines 5-40 and col. 3, line 53-col. 4, line 14). Humpleman does not disclose a filter executing the predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to at least one of the file device and a terminal device or a transmitter that transmits a packet while the filter is executing the predetermined processing based on a distribution condition of a local area network which is changed dynamically. Humpleman does disclose that the interface removes jitter from the packet streams (col. 5, lines 27-29 and col. 6, lines 46-51). Ketcham teaches, in a local area network, using a jitter buffer in order to remove jitter from the packet stream where the jitter buffer, as broadly defined, is a filter that executes predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to a network station (col. 2, lines 18-23 and col. 3, lines 22-63). Ketcham also teaches a transmitter that transmits while the filter is executing the predetermined processing, according to a limitation set by an amount of transmission data per unit of time based on a distribution condition (playout rate) (col. 2, lines 18-23 and col. 3, lines 22-63). Thus it would have been obvious to one of ordinary skill in the art at the time of the invention to have a filter executing the predetermined processing to control an amount of transmission data per unit of time for outputting the sub-stream data to at least one of the file device and a terminal device having an information reproduction function or a transmitter that transmits while the filter is

executing the predetermined processing, according to a limitation set by an amount of transmission data per unit of time based on a distribution condition of a local area network in order to remove the jitter from the incoming data stream. Humpleman in view of Ketcham does not expressly disclose that the distribution condition of a local area network changes dynamically. Humpleman in view of Ketcham does disclose that the state of the LAN may change due to fluctuations in bandwidth (Humpleman: col. 4, lines 14-29). Humpleman in view of Ketcham also discloses adjusting the distribution condition according to the state of the external network (Ketcham: col. 3, lines 42-59) where playout from the buffers is adjusted according to packet arrival times. Ito teaches, in an information distribution system, having the distribution condition is changed dynamically according to a use state of the network in order to compensate for high network load (col. 3, lines 31-57). It would have been obvious to one of ordinary skill in the art at the time of the invention to have the distribution condition change dynamically according to a use state of the local area network in order to compensate for high network load.

Conclusion

41. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Szcdzepanek et al (USPN 4,884,286) see col. 1, lines 6-10; col. 1, lines 39-51; and col. 1, line 65-col. 2, line 10 which teaches about jitter buffers as well as ensuring that a data bit is not overwritten.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Daniel J. Ryman whose telephone number is (703)305-6970. The examiner can normally be reached on Mon.-Fri. 7:00-5:00 with every other Friday off.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Huy Vu can be reached on (703)308-6602. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)305-3900.

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